

1. (TWICE AMENDED) A topical composition for treating microbes, in order to inhibit or prevent the growth on the skin or scalp of said microbes, comprising:

- P₁
- a) from about 0.001% to about 10%, by weight of the composition, of an anti-microbial active selected from the group consisting of polyvalent metal salts of pyrithione;
 - b) from greater than about 1% to about 10%, by weight of the composition, of a metal ion source selected from group consisting of zinc salts, copper salts, silver salts, nickel salts, cadmium salts, mercury salts, bismuth salts, and mixtures thereof; and
 - c) a topical carrier for the anti-microbial active and the metal salt;

wherein the weight ratio of the metal source to the anti-microbial active is from about 5:100 to about 5:1 and wherein at least 50% of the anti-microbial active is insoluble in the composition.

D₂

10. (AMENDED) A topical composition according to Claim 7, wherein the composition comprises from greater than about 1% to about 2%, by weight of the composition, of the metal ion source.

26. (AMENDED) A topical anti-dandruff composition comprising:

- D₃
- a) from about 0.1% to about 2%, by weight of the composition, of zinc pyrithione;
 - b) from greater than about 1% to about 5%, by weight of the composition, of a metal ion source useful for increasing efficacy of zinc pyrithione selected from the group consisting of zinc salts, copper salts, silver salts, nickel salts, cadmium salts, mercury salts, bismuth salts;
 - c) a topical carrier for said zinc pyrithione and said metal ion source;

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cont.

wherein the weight ratio of the metal source to the anti-microbial active is from about 5:100 to about 5:1 and wherein at least 50% of the zinc pyrithione is insoluble in the composition.

28. (AMENDED) A shampoo composition useful for improving the appearance of scalp exhibiting dandruff symptoms, said composition comprising:


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- a) from about 0.3% to about 2%, by weight of the composition, of zinc pyrithione;
 - b) from greater than about 1% to about 5%, by weight of the composition, of a metal ion source selected from the group consisting of zinc acetate, zinc oxide, zinc carbonate, zinc hydroxide, zinc chloride, zinc sulfate, zinc citrate, zinc fluoride, zinc iodide, zinc lactate, zinc olcate, zinc oxalate, zinc phosphate, zinc propionate, zinc salicylate, zinc selenate, zinc silicate, zinc stearate, zinc sulfide, zinc tannate, zinc tartrate, zinc valerate, zinc gluconate, zinc undecylate, copper disodium citrate, copper triethanolamine, copper carbonate, cuprous ammonium carbonate, cupric hydroxide, copper chloride, cupric chloride, copper ethylenediamine complex, copper oxychloride, copper oxychloride sulfate, cuprous oxide, copper thiocyanate, and mixtures thereof;
 - c) a topical carrier for said zinc pyrithione and said metal ion source; and
 - d) a deterative surfactant;

wherein the weight ratio of the metal source to the anti-microbial active is from about 5:100 to about 5:1 and wherein at least 50% of the zinc pyrithione is insoluble in the composition.

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36. (AMENDED) A topical anti-microbial composition prepared by the process of mixing:

- a) from about 0.1% to about 2%, by weight of the composition, of an anti-microbial active selected from the group consisting of polyvalent metal salts of pyrithione;

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- b) from greater than about 1% to about 5%, by weight of the composition, of a metal ion source selected from group consisting of zinc salts, copper salts, silver salts, nickel salts, cadmium salts, mercury salts, bismuth salts, and mixtures thereof; and
- c) a topical carrier for the anti-microbial active and the metal salt; wherein the weight ratio of the metal source to the anti-microbial active is from about 5:100 to about 5:1 and wherein at least 50% of the anti-microbial active is insoluble in the composition.
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 Please add the following new claims to read as follows:

51. (New) A topical composition for treating microbes, in order to inhibit or prevent the growth on the skin or scalp of said microbes, comprising:

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- a) from about 0.001% to about 10%, by weight of the composition, of an anti-microbial active selected from the group consisting of polyvalent metal salts of pyrrithione;
- b) from about 0.001% to about 10%, by weight of the composition, of a metal ion source selected from group consisting of copper salts, silver salts, nickel salts, cadmium salts, mercury salts, bismuth salts, and mixtures thereof; and
- c) a topical carrier for the anti-microbial active and the metal salt;

wherein the weight ratio of the metal source to the anti-microbial active is from about 5:100 to about 5:1 and wherein at least 50% of the anti-microbial active is insoluble in the composition.

52. (New) A topical composition for treating microbes, in order to inhibit or prevent the growth on the skin or scalp of said microbes, comprising:

- a) from about 0.001% to about 10%, by weight of the composition, of an anti-microbial active selected from the group consisting of polyvalent metal salts of pyrithione;
- b) from about 0.001% to about 10%, by weight of the composition, of a metal ion source selected from group consisting of zinc salts, copper salts, silver salts, nickel salts, cadmium salts, mercury salts, bismuth salts, and mixtures thereof; and
- c) a topical carrier for the anti-microbial active and the metal salt;

wherein the weight ratio of the metal source to the anti-microbial active is from about 5:100 to about 5:1 and wherein at least 50% of the anti-microbial active is insoluble in the composition and further wherein the composition is free of from about 1 ppm to about 30 ppm of a preservative selected from the group consisting of 5-chloro-2-alkyl-4-isothiazolin-3-one, 2-alkyl-4-isothiazolin-3-one, wherein the alkyl is selected from the group consisting of methyl, ethyl, butyl, propyl and mixtures thereof.

53. (New) A topical composition for treating microbes, in order to inhibit or prevent the growth on the skin or scalp of said microbes, comprising:

- a) from about 0.001% to about 10%, by weight of the composition, of an anti-microbial active selected from the group consisting of polyvalent metal salts of pyrithione;
- b) from about 0.5% to about 10%, by weight of the composition, of a metal ion source selected from group consisting of zinc salts, copper salts, silver salts, nickel salts, cadmium salts, mercury salts, bismuth salts, and mixtures thereof; and